

WHAT IS CLAIMED IS:

1. An electro-optical apparatus, comprising:
an electro-optical device having an image display region on which projected light from a light source is incident; and
a mounting case in which the electro-optical device is encased including a plate disposed to face one surface of the electro-optical device and a cover to cover the electro-optical, the cover having a portion abutting on the plate, the mounting case accommodating the electro-optical device by holding at least a portion of a circumferential region positioned at the periphery of the image display region of the electro-optical device with at least one of the plate and the cover,
the cover including a cover main body to accommodate the electro-optical device and a cooling air introducing portion provided to extend from or along the cover main body; and
the cooling air introducing portion having a cooling air scattering prevention portion to allow the cooling air, which is blown to the electro-optical device encased in the mounting case, to flow toward the cover main body.
2. The electro-optical apparatus according to claim 1,
the cooling air scattering prevention portion further comprising:
a baffle plate.
3. The electro-optical apparatus according to claim 1,
the cooling air introducing portion includes a slope portion having a pointed shape whose tip faces a direction of the flow of the cooling air, and
the cooling air scattering prevention portion includes the slope portion.
4. The electro-optical apparatus according to claim 3,
the baffle plate being provided so as to surround a surface constituting the slope portion.
5. The electro-optical apparatus according to claim 3,
the cover main body having a window to expose the image display region to the outside, and
a surface of the image display region of the electro-optical device exposed through the window being continuous with the surface constituting the slope portion.
6. The electro-optical apparatus according to claim 5,
the edge of the window having a tapered shape.
7. The electro-optical apparatus according to claim 1,

the cover further having a cooling air discharging portion to discharge the cooling air which is blown from the cover main body from the cover, and

the cooling air discharging portion having a first surface-area increasing portion to increase the surface-area thereof.

8. The electro-optical apparatus case according to claim 1,

the cover having a side wall portion facing the side of the electro-optical device in the cover main body; and

the side wall portion having a second surface-area increasing portion to increase the surface-area thereof.

9. The electro-optical apparatus according to claim 8,

the cooling air introducing portion including a baffle portion to blow the cooling air to the side wall portion, and

the cooling air scattering prevention portion includes the baffle portion.

10. The electro-optical apparatus according to claim 7,

at least one of the first surface-area increasing portion and the second surface-area increasing portion including fins provided to protrude from the surface of the cover and/or dimples provided to form recesses on the surface of the cover.

11. The electro-optical apparatus according to claim 10,

the fins being provided to follow the flow of the cooling air.

12. The electro-optical apparatus according to claim 10,

the fins including a first column of fins and a second column of fins which extend parallel to the first column of fins, and

a gap between the first column of fins and the second column of fins being 1 mm or more.

13. The electro-optical apparatus according to claim 1,

the cover being made of a material having a high heat conductivity.

14. An electro-optical apparatus comprising:

an electro-optical device having an image display region on which projected light from a light source is incident; and

a mounting case in which the electro-optical device is encased including a plate disposed to face one surface of the electro-optical device and a cover to cover the electro-optical device, the cover having a portion abutting on the plate, the mounting case accommodating the electro-optical device by holding at least a portion of a circumferential

region positioned at the periphery of the image display region of the electro-optical device with at least one of the plate and the cover:

the cover including a cover main body and a cooling air introducing portion;

and

the cooling air introducing portion having a slope portion having a pointed shape.

15. An electro-optical apparatus comprising:

an electro-optical device having an image display region on which projected light from a light source is incident; and

a mounting case in which the electro-optical device is encased including a plate disposed to face one surface of the electro-optical device and a cover to cover the electro-optical device, the cover having a portion abutting on the plate, the mounting case accommodating the electro-optical device by holding at least a portion of a circumferential region positioned at the periphery of the image display region of the electro-optical device with at least one of the plate and the cover,

the cover including a cooling air introducing portion, and

the cooling air introducing portion having a cooling air guiding portion to allow the cooling air, which is blown to the electro-optical device encased in the mounting case, to flow toward the image display region.

16. A mounting case, comprising:

a plate disposed to face one surface of an electro-optical device having an image display region on which projection light from a light source is incident; and a cover to cover the electro-optical device, the cover having a portion abutting on the plate;

the mounting case accommodating the electro-optical device by holding at least a portion of a circumferential region positioned at the periphery of the image display region of the electro-optical device with at least one of the plate and the cover,

the cover including a cover main body and a cooling air introducing portion, and

the cooling air introducing portion having a cooling air scattering prevention portion to allow the cooling air which is blown to the electro-optical device encased in the mounting case to flow toward the cover main body.

17. A projection-type display apparatus, comprising:

an electro-optical device encased in a mounting case according to claim 1;
the light source;

an optical system to guide the projected light into the electro-optical device;
a projection optical system to protect the projected light emitted from the
electro-optical device; and
a cooling air discharging portion to blow out a cooling air to the electro-optical
device encased in the mounting case.